

Customer No.: 31561
Application No: 10/707,359
Docket No.:11491-US-PA

REMARKS

Present Status of the Application

This is a full and timely response to the outstanding non-final Office Action mailed on March 3, 2005. It is noted with great appreciation that the Office Action considers claim 23 and those claims (24-27) which depend on claim 23 as allowable if claim 23 is rewritten in independent form including all of the limitations of the base claim and any intervening claims. However, the Office Action rejects claims 1-3, 5-6, 8-9 under 35 U.S.C. 102 (b) as being anticipated by Chan et al. (USP 6,252,277) and claims 4, 7, 10-22, 28-33 under 35 U.S.C. 103(a) as being unpatentable over by Chan.

Claims 1-17 remain pending of which claims 1, 10 and 21 have been amended to more accurately describe the present invention. It is believed that no new matter is added by way of these amendments made to the claims or otherwise to the application.

After carefully considering the remarks set forth in this Office Action and the cited references, Applicants respectfully submitted that the presently pending claims are already in condition for allowance. Reconsideration and withdrawal of the Examiner's rejection are requested.

Customer No.: 31561
Application No: 10/707,359
Docket No.: 11491-US-PA

Discussion of Office Action Rejections

The Office Action rejected claims 1-3, 5-6, 8-9 under 35 U.S.C. 102(b) as being anticipated by Chan et al. (US 6,252, 277, Chan hereinafter).

Applicants respectfully assert that Chan is legally deficient for the purpose of anticipating claim 1 for the reasons that each and every element of the claim in issue is not found in the prior art reference.

The present invention teaches substantially in claim 1, among other things, ‘...performing a sidewall doping process to form a doped region in the substrate at only the upper trench sidewall ...’. On the other hand, Chan teaches that the LDD regions 40 extend below and under the bottom corners of the trench 42 (see col. 5, ln 44-46 and Figures 4F-4K, 5, 6F-6K, 7). Accordingly, Chan fails to teach or suggest claim 1 of the present invention in this regard.

Since claims 2-3, 5-6, 8-9 are dependent claims, which further define the invention recited in claim 1, Applicants respectfully assert that these claims also are in condition for allowance. Thus, reconsideration and withdrawal of this rejection are respectfully requested.

The Office Action rejected claims 4, 7, 10-22, 28-33 under 35 U.S.C. § 103(a) as being unpatentable over Chan et al.

With regard to the 103 rejections of claims by Chan, Applicants respectfully submit that these claims defined over the prior art references for at least the reasons discussed above.

Customer No.: 31561
Application No: 10/707,359
Docket No.:11491-US-PA

For at least the reason set forth hereinbefore, Applicants submit that the rejections to claims 4, 7, 10-22, 28-33 have been traversed, rendered moot, and/or accommodated, and that the pending claims 4, 7, 10-22, 28-33 are in condition for allowance. Favorable consideration and allowance of the present application and all pending claims are hereby courteously requested.

Customer No.: 31561
Application No: 10/707,359
Docket No.: 11491-US-PA

CONCLUSION

For at least the foregoing reasons, it is believed that the presently pending claims 1-33, are in proper condition for allowance. If the Examiner believes that a telephone conference would expedite the examination of the above-identified patent application, the Examiner is invited to call the undersigned.

Date: *Sept. 15, 2005*

Respectfully submitted,

Belinda Lee
Belinda Lee

Registration No.: 46,863

Jianq Chyun Intellectual Property Office
7th Floor-1, No. 100
Roosevelt Road, Section 2
Taipei, 100
Taiwan
Tel: 011-886-2-2369-2800
Fax: 011-886-2-2369-7233
Email: belinda@jicpgroup.com.tw
Usa@jicpgroup.com.tw